

SUMMARY
BIOLOGICAL OPINION FOR THE LITTLEFIELD SCHOOL DISTRICT RECREATION AND PUBLIC
PURPOSES LEASE AND PATENT

Date of Opinion: 26 May 1995

Action Agency: Bureau of Land Management, Shivwits Resource Area, St. George, Utah

Project: Proposed lease and patent of 40 acres of land near Littlefield, Arizona to the Littlefield School District for subsequent development of a K-12 school and community center.

Listed Species Affected: Mojave population of the desert tortoise (*Gopherus agassizii*), a federally listed threatened species.

Biological Opinion: Non-jeopardy

Incidental Take Statement:

Level of take anticipated: Anticipated take includes no more than one desert tortoise injured or killed as a result of project construction, one tortoise every two years resulting from use of the facility, and no more than seven desert tortoises and one clutch of desert tortoise eggs as a result of excavation of eggs and occupied burrows and moving of animals and eggs out of harm's way.

Reasonable and Prudent Measures: The biological opinion presents four measures for reducing incidental take. Implementation of these measures through the terms and conditions are mandatory.

Terms and Conditions: Twenty mandatory terms and conditions are included to implement the reasonable and prudent measures. They include a variety of measures to reduce incidental take of desert tortoises, such as minimization of avoidance of taking individual animals (but moving animals out of harm's way when necessary), education of project personnel, reducing the potential for predation on desert tortoises, fencing to exclude tortoises from the facility, and monitoring of take and habitat loss.

Conservation Recommendations: The Bureau should monitor any relocated desert tortoises to improve our knowledge of relocation techniques, and work with the school district to develop environmental education materials addressing the conservation of tortoises.



UNITED STATES
DEPARTMENT OF THE INTERIOR
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May 26, 1995

In Reply Refer To:
AESO/SE
2-21-95-F-278

MEMORANDUM

TO: Area Manager, Shivwits Resource Area, Bureau of Land Management,
St. George, Utah

FROM: State Supervisor

SUBJECT: Biological Opinion for the Littlefield School District Recreation and Public
Purposes Lease and Patent

This biological opinion responds to your request for formal consultation with the Fish and Wildlife Service (Service) pursuant to section 7 of the Endangered Species Act of 1973 (16 U.S.C. 1531-1544), as amended (Act). Your request was dated April 24, 1995, and received by us on April 26, 1995. At issue are impacts resulting from proposed leasing and patenting of up to 40 acres of public land just east of Beaver Dam, Mohave County, Arizona, and subsequent construction of the Littlefield School and Community Center. These impacts may affect the Mojave population of the desert tortoise (*Gopherus agassizii*), a federally listed threatened species.

This biological opinion was prepared using information from the following sources: your April 24, 1995, request for consultation; and the environmental assessment and section 7 evaluation for the project [Bureau of Land Management (Bureau) 1995a and b, respectively]; informal consultation between our staffs; and our files.

Biological Opinion

After reviewing the current status of the desert tortoise, the environmental baseline for the action area, the effects of the proposed action, and the cumulative effects, it is the Service's biological opinion that the proposed action is not likely to jeopardize the continued existence of the desert tortoise and is not likely to destroy or adversely modify desert tortoise critical habitat.

Description of the Proposed Action

The Littlefield School District has submitted a request to the Bureau for a Recreation and Public Purposes (R&PP) Lease and eventual patent of 29 acres of public land in T.41N., R.15W., SE4SW4 section 33 (Figure 1). The School District proposes to construct a Kindergarten through grade 12 school for approximately 200 to 500 students (Figure 2). The school would also serve as a community center, and would include office and supply space for State, County, and local governments. The school and community center would serve the residents of Beaver Dam, Littlefield, Scenic, and Desert Springs. The school grounds would include park and recreational areas for public use. Six small (less than 100 ft² each) hazardous waste sites would be cleaned up prior to construction. A front-end loader would be used to excavate the sites, and the hazardous material would be disposed of in accordance with all pertinent regulations. The school and a portion of the playgrounds are proposed to be constructed within three years. The School District has only applied to lease 29 acres; however, Bureau leasing regulations require that the entire 40 acre parcel within the above legal description be offered for lease (Bureau 1995a).

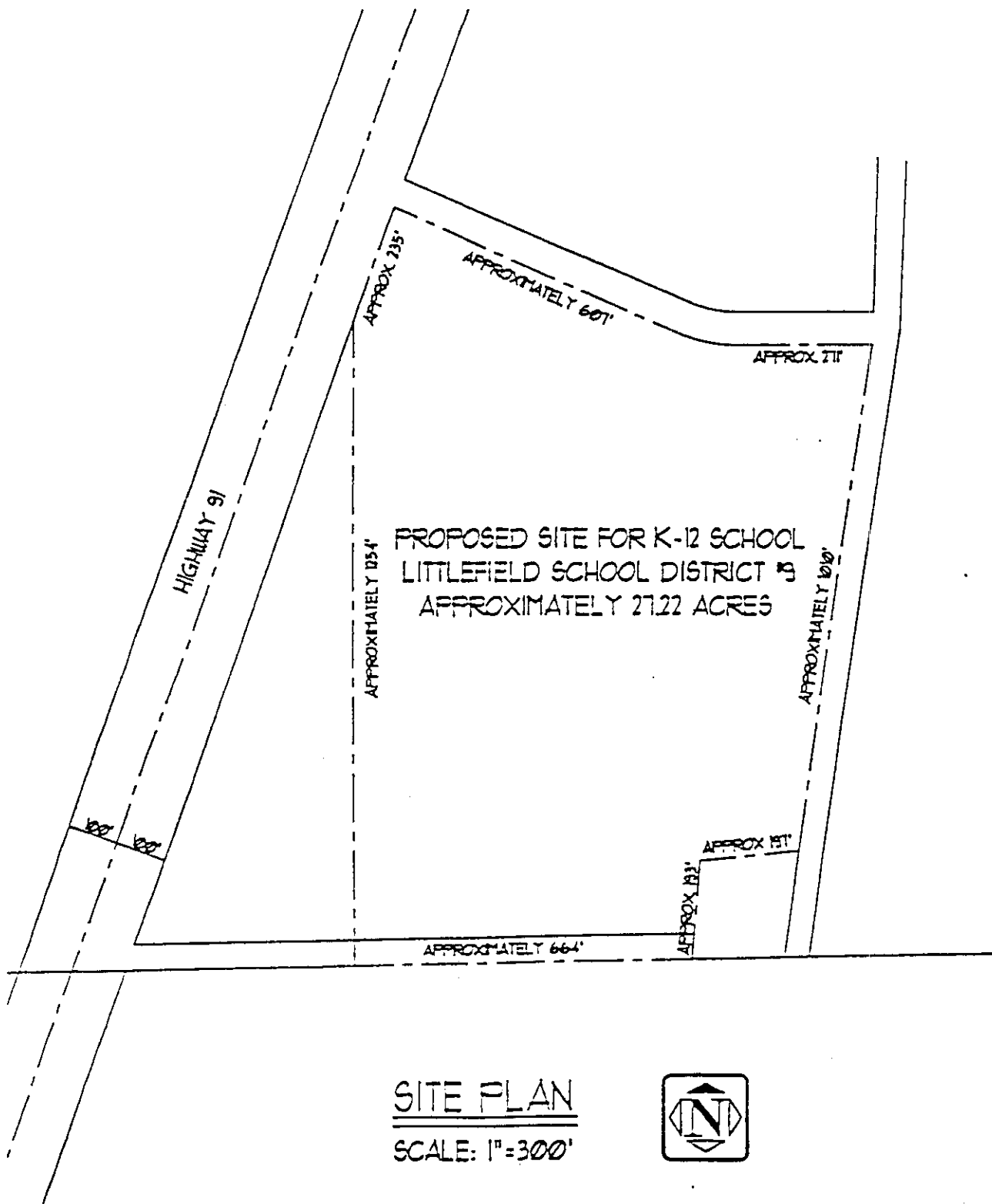
The Bureau proposes the following measures to reduce the effects of the project on the desert tortoise and its habitat:

1. Prior to onset of any activity, the site will be surveyed for desert tortoise sign by a Bureau wildlife biologist for 100 percent coverage of the site, plus an additional area extending 100 yards from the site boundaries. Any tortoises found on the site would be relocated to public lands nearby (Bureau 1995a and b).
2. A tortoise-proof barrier is planned for installation to separate the school site from nearby tortoise habitat to the east (Bureau 1995b). The entire leased/patented area would be fenced by a chain-link fence.
3. If a tortoise wanders onto the site during the project, all activity would cease until the tortoise wanders off the site or a qualified person can move it safely.
4. A desert tortoise biologist would be responsible for informing all employees working on this project about tortoises (including status, protocols for dealing with tortoises if and when they are encountered, and the definition of take).
5. All activity associated with the construction of the school and surrounding grounds would occur on lands within the R&PP lease.
6. At no time shall vehicle or equipment fluids be dumped on public lands. All accidental spills must be reported to the Bureau and cleaned up immediately, using the best available practices. All spills of federally or State listed hazardous materials that exceed the reportable quantities shall be promptly reported to the appropriate State agency and the Arizona Strip District of the Bureau.

Figure 1: Location map for proposed Littlefield School and Community Center



Figure 2: Site plan for Littlefield School and Community Center



7. No surface disturbance shall be authorized that would impact any threatened or endangered species prior to compliance with the Endangered Species Act.
8. Construction sites shall be maintained in a sanitary condition at all times. Waste materials would be placed in covered receptacles to avoid attracting predators of desert tortoises and disposed of promptly at an appropriate waste disposal site. "Waste" means all discarded matter including, but not limited to, human waste, trash, garbage, refuse, oil drums, petroleum products, ashes, and equipment.
9. No dogs will be allowed on-site during construction.
10. No discharge of firearms will be allowed on-site during construction.
11. Compensation for loss of desert tortoise habitat attributable to construction of the school and community center shall be sought by the Bureau, in accordance with "Compensation for the Desert Tortoise" (Desert Tortoise Management Oversight Group 1991).

Status of the Species

On August 4, 1989, the Service published an emergency rule listing the Mojave population of the desert tortoise as endangered. In a final rule dated April 2, 1990, the Service determined the Mojave population of the desert tortoise to be threatened. The desert tortoise is a large, herbivorous reptile found in portions of the California, Arizona, Nevada, and Utah deserts, and in Sonora and northern Sinaloa, Mexico. The threatened Mojave population is found in California, Nevada, and north of the Colorado River in Arizona and southwestern Utah. In Arizona, desert tortoises of the Mojave population are most active during the spring and early summer when annual plants are most common. Additional activity occurs during warmer fall months and after infrequent summer monsoons. Desert tortoises spend the remainder of the year in burrows, escaping the extreme weather conditions of the desert.

The final recovery plan for the Mojave population of the desert tortoise (Fish and Wildlife Service 1994) proposes the establishment of 14 Desert Wildlife Management Areas (DWMAs) in six recovery units. Land management in DWMAs would target the reduction or elimination of those factors which have caused declines in desert tortoise populations. The boundaries of proposed DWMAs are not precisely defined in the recovery plan, but would be established by the Bureau and other land management agencies in coordination with the Service, State wildlife agencies, and others. The proposed project lies near the southern boundary of the Beaver Dam Slope DWMA in the northeastern Mojave recovery unit.

The Service designated critical habitat for the Mojave population of the desert tortoise in a Federal Register notice dated February 8, 1994 (59 FR 5820-5846, also see corrections at 59 FR 9032-9036). The proposed lease/patent area lies approximately one mile south of designated critical habitat.

Further information on the range, biology, and ecology of the desert tortoise can be found in Burge and Bradley (1976), Luckenbach (1982), Turner et al. (1984), Weinstein et al. (1987), various papers by J.R. Spotila and others in Herpetological Monographs published June 30, 1994, various papers in Bury and Germano (eds.)(1994), and Service (1994).

Environmental Baseline

The project area is located in the northeastern Mojave Desert on the southern end of the Beaver Dam Slope, which is a bajada of the Beaver Dam Mountains. The project area lies approximately one mile northwest of the Virgin River and 0.5 mile northeast of Beaver Dam Wash. Soils are gravelly fine sandy loams on a gentle slope (Bureau 1995b). Vegetation of the area is typical of the creosote bush series of Mohave desertscrub (Turner 1982, Bureau 1995b). Creosote (*Larrea tridentata*) and bursage (*Ambrosia dumosa*) are the dominant perennial plants (Bureau 1995b). The area has been disturbed by a variety of human uses or human-caused impacts, including off-highway vehicle use, illegal dumping, camping, and sand and gravel extraction (Bureau 1995b).

The project area lies within category 3 desert tortoise habitat. Category 3 habitats are those that contain low to medium densities of desert tortoises, but are not essential to the maintenance of viable populations (Spang et al. 1988). Critical habitat for the desert tortoise has been designated approximately one mile north of the project site, and the Beaver Dam Slope is considered a DWMA in the tortoise recovery plan. However, the area immediately adjacent to Beaver Dam, including the project area, is not likely to be designated by the Bureau as a part of the DWMA due to the high level of human-caused impacts and apparent low densities of tortoises.

The section in which the project site lies was surveyed for desert tortoises in 1982 (Bureau 1991) and again in 1994 (Topham 1994). A triangular transect conducted in 1982 yielded five corrected sign, all of which were sheltersites. The 1994 surveys yielded no sign of desert tortoises in the southwestern quarter of section 33, where the project site occurs; however, numerous sheltersites, scat, and other tortoise sign were found in the southeastern quarter of section 33. A live desert tortoise was located in 1994 approximately 0.1 mile southeast of the project site in T40N, R15W, section 4 (Topham 1994). Neither the 1982 nor the 1994 surveys were 100 percent surveys of the project area; thus sign or live tortoises may have occurred on the project site but were not observed. Desert tortoise habitat in the vicinity of Beaver Dam, including the project area, has been disturbed by a variety of human activities. Tortoises are probably rare or absent within the project boundaries, but habitat quality improves and animals probably occur in increasing densities to the east and north.

Effects on the Listed Species

Effects of Proposed Action

Implementation of the proposed action would result in the conversion of 29 acres of desert tortoise habitat to the grounds of the Littlefield School and Community Center. All habitat and any desert tortoises on the site would be lost. An additional 11 acres of desert tortoise habitat would be transferred to the Littlefield School District that would be available for development in the future. Additional tortoises that wander onto the project site from adjacent areas could be injured, killed, or captured during construction or subsequent use of the school and community center. In the Beaver Dam Access Project (2-21-94-F-531, Bureau 1994), the Bureau proposed a desert tortoise barrier fence along the east side of the 40-acre project boundary north to Highway 91. This fence would prevent tortoises from moving onto the project area from the east and northeast. However, tortoises could still move onto the site from other directions, particularly the northwest.

Vehicles accessing the school and community center would likely result in increased traffic on Highway 91 and perhaps other secondary roads in desert tortoise habitat. This increased traffic may result in increased levels of mortality and injury of desert tortoises as a result of collisions with vehicles and collection of individuals encountered on roads.

Common ravens (*Corvus corax*) are efficient predators of desert tortoises (Campbell 1983, Miller 1932) and are attracted to refuse, water sources, and perching or nesting sites. Refuse generated by human activities, water (such as for irrigating landscaping), and perching or nesting sites such as signposts and powerlines may attract common ravens to the project site and increase predation of desert tortoises. Other predators, particularly the coyote (*Canis latrans*), are also attracted to refuse and water and could contribute to elevated predation rates.

The Bureau has proposed a preconstruction survey, relocation of tortoises on the site, a worker education program, strict control of trash, a chain-link fence around the leased area, compensation in accordance with current policy, and other measures to minimize take of desert tortoises. If properly maintained and if there is zero clearance between the fence and the ground, the chain-link fence would exclude most tortoises from the site. Very small, hatchling tortoises could perhaps pass through the chain-link, and larger animals may dig under the fence or enter through access points for vehicles. After completion of the tortoise barrier fence along the east side of the project site north to Highway 91 (Bureau 1994), the chances of a tortoise moving onto the project site would be much reduced, because currently animals are most likely to come from the east or north of the project site where densities are relatively high. The area to the south is highly disturbed and may soon be developed into an addition to the Beaver Dam Gold Course. This area is habitat for few or no tortoises (Topham 1994). Similarly, the area to the west is also disturbed by a variety of human activities and likely supports very few tortoises.

Cumulative Effects

Cumulative effects are those impacts of future non-Federal (State, local government, and private) actions that are reasonably certain to occur in the project area. Future Federal actions would be subject to the consultation requirements established in section 7 of the Act and, therefore, are not considered cumulative to the proposed project. Due to the extent of the lands in this area of the Mojave Desert administered by the Bureau, many of the actions that are reasonably expected to occur within the vicinity of the project site would be subject to section 7 consultations. The Service is currently in formal consultation with the Bureau over proposed livestock grazing on the Beaver Dam Slope to the north of the project area and on the Virgin Slope to the south of Interstate 15. Considerable acreage between Interstate 15 and the Virgin River, near Beaver Dam, and in the vicinity of Mesquite, Nevada and Littlefield are privately owned and continued development of these non-Federal lands is anticipated. Proposals are currently being developed for expanding the Beaver Dam Golf Course, immediately south of the project site (Topham 1994), and for developing 2,000 acres of land between Beaver Dam and Interstate 15 (John Griffith, ERA Realtor, St. George, Utah, pers. comm. 1995). Non-Federal actions that may result in a take of desert tortoises require a section 10(a)(1)(B) permit from the Service. Cumulative impacts of future State and private projects will be addressed through the section 10(a)(1)(B) permit process.

The Service believes the effects described above are not likely to jeopardize the continued existence of the desert tortoise or result in the adverse modification or destruction of desert tortoise critical habitat. We present this conclusion for the following reasons:

1. The proponent's project description includes features to minimize take of desert tortoises and mitigate the direct and indirect impacts of the proposed action.
2. The desert tortoise habitat that would be disturbed by the project is limited in size, poor in quality, and has not been identified as important for recovery of the species and is not designated as critical habitat.
3. Impacts resulting from the project would not contribute to further fragmentation of desert tortoise populations.

Incidental Take Statement

Section 9 of the Act prohibits the take of listed species without special exemption. Taking is defined as harassing, harming, pursuing, hunting, shooting, wounding, killing, trapping, capturing, collecting, or attempting to engage in any such conduct. Harm is further defined to include significant habitat modification or degradation that results in death or injury to listed species by significantly impairing essential behavior patterns, including breeding, feeding, or sheltering (50 CFR 17.3). Harass is defined as actions that create the likelihood of injury to listed species to such an extent as to significantly disrupt normal behavior patterns which include, but are not limited to, breeding, feeding, or sheltering. Incidental take is any take of

a listed animal species that results from, but is not the purpose of, carrying out an otherwise lawful activity conducted by the Federal agency or the applicant. Under the terms of sections 7(b)(4) and 7(o)(2) of the Act, taking that is incidental to and not intended as part of the agency action is not considered to be prohibited under the Act provided that such taking is in compliance with this incidental take statement.

The measures described below are non-discretionary, and must be implemented by the agency so that they become binding conditions of any grant or permit issued to the applicant, as appropriate, in order for the exemption in section 7(o)(2) to apply. The Bureau has a continuing duty to regulate the activity covered by this incidental take statement. If the Bureau (1) fails to require the applicant to adhere to the terms and conditions of the incidental take statement through enforceable terms that are added to the permit or grant document, and/or (2) fails to retain oversight to ensure compliance with these terms and conditions, the protective coverage of section 7(o)(2) may lapse.

This biological opinion anticipates the following forms of take:

- 1) One desert tortoise in the form of direct mortality resulting from construction of the Littlefield School and Community Center.
- 2) Seven desert tortoises through harassment associated with excavation of occupied burrows and movement of desert tortoises out of harm's way.
- 3) One desert tortoise every two years in the form of direct mortality or injury resulting from operation and use of the school and community center.
- 4) One clutch of desert tortoise eggs in the form of excavation of a nest and moving the eggs from harm's way.

This biological opinion does not authorize any form of take not incidental to construction, use, and maintenance of the Littlefield School and Community Center, as described in Bureau (1995b). If the incidental take authorized by this opinion is met, the Bureau shall immediately notify the Service in writing. If the incidental take authorized by this opinion is exceeded, the Bureau must immediately reinitiate consultation with the Service to avoid a violation of section 9 of the Act. In the interim, the project proponent or its contractors must cease the activity resulting in the take if it is determined that the impact of additional taking will cause an irreversible and adverse impact on the species. The Bureau should provide an explanation of the cause of the taking.

Reasonable and Prudent Measures

The Service believes the following reasonable and prudent measures are necessary and appropriate to minimize the incidental take authorized by this biological opinion:

1. Worker education programs, defined construction areas, and well-defined operational procedures shall be implemented.
2. All desert tortoises and egg clutches on the project site shall be relocated to nearby suitable habitat.
3. Fencing shall be erected to prevent tortoises from moving onto the site.
4. Attraction of common ravens and other potential desert tortoise predators to the project area shall be reduced to the maximum extent possible.

Terms and Conditions

In order to be exempt from the prohibitions of section 9 of the Act, the Bureau must comply with the following terms and conditions, which implement the reasonable and prudent measures described above. These terms and conditions are nondiscretionary. Terms and conditions 1.b., 1.e., 1.f., 1.g., 1.h., 1.i., 1.j., 1.k., 2.a., 2.b., 3.a., and 4.a. are adapted from Bureau (1995a, 1995b) and personal communications with Ilene Anderson and Tim Duck (Shivwits Resource Area, May, 1995), but contain slight modifications or added detail.

1. The following terms and conditions implement reasonable and prudent measure number one:

- a. The Bureau shall inform the Littlefield School District that project activities are exempt from section 9 of the Act, as described in this opinion's incidental take statement, only if all terms and conditions described herein are implemented.

- b. All personnel who implement actions authorized by this biological opinion shall be briefed on the status of the desert tortoise and protection measures designed to reduce potential impacts to this species. A qualified desert tortoise biologist (a biologist approved by the Bureau) shall be responsible for informing employees about tortoises (including information provided by the Service and the Bureau on the life history of the tortoise, its status, protocols for dealing with tortoises if and when they are encountered, terms and conditions in this biological opinion, and the definition of and penalties for take). Personnel shall be advised that handling, harming, or harassing desert tortoises without specific authorization is a violation of the Act. Personnel shall also be advised of the penalties of up to \$200,000 and six months in prison for taking a listed species without a permit. Handouts summarizing this information shall be provided to all personnel implementing actions that may result in a take of desert tortoise.

- c. The Bureau shall designate a "field contact representative" (FCR) who shall be responsible for overseeing compliance with these terms and conditions and for coordination on compliance with the Service. The FCR, authorized biologist(s) (see

term and condition 2.c. for definition), and qualified biologist(s) shall have the authority and responsibility to halt all project activities that are in violation of these terms and conditions. The FCR shall have a copy of all terms and conditions.

d. Vehicle parking and equipment staging areas shall be located in previously disturbed areas to the maximum extent feasible.

e. All activity associated with the construction of the school and surrounding grounds shall occur on lands within the R&PP lease.

f. At no time shall vehicle or equipment fluids be dumped on public lands. All accidental spills must be reported to the Bureau and cleaned up immediately, using the best available practices. All spills of federally or State listed hazardous materials that exceed the reportable quantities shall be promptly reported to the appropriate State agency and the Arizona Strip District of the Bureau.

g. No surface disturbance shall be authorized that would impact any threatened or endangered species prior to compliance with the Endangered Species Act.

h. Prior to construction of the perimeter chain-link fence and removal of tortoises from within the fence (terms and conditions 2 and 3), no dogs shall be allowed on-site.

i. No discharge of firearms shall be allowed on-site during construction.

j. If a desert tortoise is found on the project site during construction or operation of the school and community center, an authorized biologist shall relocate the tortoise to suitable habitat in accordance with term and condition 2.

k. Compensation for loss of desert tortoise habitat attributable to construction of the school and community center shall be obtained prior to lease issuance by the Bureau in accordance with "Compensation for the Desert Tortoise" (Desert Tortoise Management Oversight Group 1991).

l. Within 90 days after completion of construction, the Bureau shall submit a monitoring report to the Arizona Ecological Services State Office. The report shall briefly document the effectiveness of the desert tortoise mitigation measures, actual acreage of desert tortoise habitat disturbed, the number of desert tortoises excavated from burrows, the number of desert tortoises moved from construction sites, and information on individual desert tortoise encounters as stipulated in term and condition 2.d. The report shall make recommendations for modifying or refining these terms and conditions to enhance desert tortoise protection and reduce needless hardship on the project proponent.

2. The following terms and conditions implement reasonable and prudent measure number two:

a. Following construction of the chain-link perimeter fence (term and condition 3), an authorized biologist(s) shall survey the entire enclosed area and relocate all desert tortoises and tortoise eggs within the fenced area pursuant to terms and conditions 2b., 2d., and 2e. All desert tortoise cover sites within the fence shall be examined for occupancy. Unoccupied cover sites and those from which desert tortoises are removed shall be collapsed to prevent further use. When fencing is complete, and the authorized biologist(s) has removed all desert tortoises from the fenced area, construction activities inside the fence may proceed without the presence of a biological monitor.

b. If a desert tortoise or desert tortoise eggs are inside the fenced project site, or along the fence route and the fence cannot be constructed so the tortoise or eggs are outside the fence or would not be disturbed by fence construction, they shall be relocated by an authorized biologist into the closest suitable habitat within 2 miles of the collection site, but east or north of the Cemetery Road to Highway 91 tortoise-proof barrier fence, that will ensure the animal or eggs are reasonably safe from death, injury, or collection associated with the project or other activities. The authorized biologist shall be allowed some discretion to ensure that survival of each relocated tortoise or egg clutch is likely. Desert tortoises or their eggs shall not be placed on lands outside the administration of the Federal government without the written permission of the landowner. Burrows from which desert tortoises or eggs are removed and unoccupied burrows in areas to be disturbed by construction or lying inside the fence shall be collapsed to prevent entry by desert tortoises. Handling procedures for tortoises and eggs shall adhere to protocols outlined in Desert Tortoise Council (1994).

c. Prior to implementing any activities that may result in a take of desert tortoises on the 11-acre parcel of the lease/patent outside of the fenced project site, all desert tortoises and desert tortoise eggs located on that parcel shall be relocated pursuant to terms and conditions 2.b., 2.d., and 2.e.

d. Only biologists authorized by the Service shall handle desert tortoises. The Service authorizes Tim Duck and Dustin Haines to handle desert tortoises pursuant to these terms and conditions. If other personnel are to be authorized for handling desert tortoises, the Bureau shall submit the name(s) of the proposed authorized biologist(s) to the Service for review and approval at least 15 days prior to the onset of activities.

e. The authorized biologist(s) shall maintain a record of all desert tortoises encountered during project activities. This information shall include for each desert tortoise:

- The locations and dates of observation
- General condition and health, including injuries and state of healing and whether animals voided their bladders
- Location moved from and location moved to
- Diagnostic markings (i.e. identification numbers of marked lateral scutes)

No notching of scutes or replacement of fluids with a syringe is authorized.

3. The following term and condition implements reasonable and prudent measure number three:

- a. Prior to implementation of any ground-disturbing activities, a chain-link fence shall be installed on the perimeter of the 29-acre project site. The chain-link fence shall maintain zero clearance with the ground.
- b. As described in Bureau (1994), the Bureau shall promptly complete the tortoise-proof barrier fence on the east side of the Cemetary Road to Highway 91.
- c. A qualified biologist shall accompany construction crews to ensure that construction of both the chain-link fence described in 3.a. and the tortoise-proof barrier fence described in 3.b. do not result in damage to sheltersites or death or injury to desert tortoises. Whenever possible, fence placement shall be modified to exclude tortoises and tortoise burrows from the project site and from the west side of the tortoise-proof barrier fence. If damage to any tortoise burrow cannot be avoided, it shall be excavated and any tortoises found relocated in accordance with term and condition 2.
- d. The tortoise-proof barrier fence shall be inspected quarterly to ensure its integrity is maintained.

4. The following terms and conditions implement reasonable and prudent measure number four:

- a. Construction sites shall be maintained in a sanitary condition at all times; waste materials at those sites shall be placed in covered receptacles to avoid attracting predators of desert tortoises and disposed of promptly at an appropriate waste disposal site. "Waste" means all discarded matter including, but not limited to, human waste, trash, garbage, refuse, oil drums, petroleum products, ashes, and equipment.
- b. All trash and food items generated during use of the school and community center facilities shall be promptly contained within closed, raven-proof containers. The containers shall be regularly emptied and/or removed from the site to reduce attractiveness of the area to ravens and other desert tortoise predators.

Disposition of Dead, Injured, or Sick Desert Tortoises

Upon locating a dead, injured, or sick individual of a listed species, initial notification must be made to Special Agent Melvin Holt, Federal Building, Room 8, 26 North McDonald, Mesa, Arizona, (Telephone: 602/261-6443) within three working days of its finding. Written notification must be made within five calendar days and include the date, time, and location of the animal, a photograph, and any other pertinent information. The notification shall be sent to Special Agent Holt with a copy to the Phoenix Office. Care must be taken in handling sick or injured animals to ensure effective treatment and care, and in handling dead specimens to preserve biological material in the best possible state. If possible, the remains of intact desert tortoises shall be placed with educational or research institutions holding appropriate State and Federal permits. If such institutions are not available, the information noted above shall be obtained and the carcass left in place.

Arrangements regarding proper disposition of potential museum specimens shall be made with the institution prior to implementation of the action. Injured animals should be transported to a qualified veterinarian by an authorized biologist. Should any treated desert tortoise survive, the Service should be contacted regarding the final disposition of the animal.

Conservation Recommendations

Sections 2(c) and 7(a)(1) of the Act direct Federal agencies to utilize their authorities to further the purposes of the Act by carrying out conservation programs for the benefit of listed species. Conservation recommendations are discretionary agency activities to minimize or avoid effects of a proposed action on listed species or critical habitat, to help implement recovery plans, or to develop information on listed species. The recommendations provided here do not necessarily represent complete fulfillment of the agency's section 2(c) or 7(a)(1) responsibilities for the desert tortoise. In furtherance of the purposes of the Act, we recommend implementing the following actions:

1. The Bureau or Littlefield School District should monitor the movements, survivorship, and condition of relocated desert tortoises to evaluate the effectiveness of the relocation. This information could be used to develop more successful relocation techniques.
2. The Bureau should cooperate with Littlefield School District to develop environmental educational materials, such as posters, video programs, etc. that could be used in the school's curricula and at the community center to inform the public about the status of the desert tortoise, its biology, and the threats to its survival. A portion of the compensation funds under term and condition 1.k. may be applied to this effort.

The Service requests notification of the implementation of these conservation recommendations so we can be kept informed of actions that either minimize or avoid adverse effects, or that benefit listed species or their habitats.

Conclusion

This concludes formal consultation on the issuance of a Recreational and Public Purposes Lease for the construction and operation of the Littlefield School and Community Center by the Littlefield School District. Reinitiation of formal consultation is required where discretionary Federal agency involvement or control over the action has been maintained (or is authorized by law) and if: 1) the amount or extent of incidental take is exceeded; 2) new information reveals effects of the agency action that may adversely affect listed species or critical habitat in a manner or to an extent not considered in this opinion; 3) the agency action is subsequently modified in a manner that causes an effect to a listed species or critical habitat that was not considered in this opinion; or 4) a new species is listed or critical habitat designated that may be affected by this action (50 CFR 402.16). In instances where the amount or extent of incidental take is exceeded, any operations causing such take must cease pending reinitiation. Any questions or comments should be directed to Jim Rorabaugh or Ted Cordery of my staff.



Sam F. Spiller

cc: Regional Director, Fish and Wildlife Service, Albuquerque, NM (AES)
Office Supervisor, Fish and Wildlife Service, Las Vegas, NV
Field Supervisor, Fish and Wildlife Service, Ventura, CA
Field Supervisor, Fish and Wildlife Service, Carlsbad, CA
State Supervisor, Fish and Wildlife Service, Reno, NV
State Supervisor, Fish and Wildlife Service, Salt Lake City, UT
State Director, Bureau of Land Management, Phoenix, AZ
Director, Arizona Game and Fish Department, Phoenix, AZ

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